# NFRC ERP Application Attachment I—Fish, Wildlife, Listed Species and their Habitats

Under the Endangered Species Act of 1973 (ESA), species may be listed as either endangered or threatened. "Endangered" means a species is in danger of extinction throughout all or a significant portion of its range. "Threatened" means a species is likely to become endangered within the foreseeable future. All species of plants and animals, except pest insects, are eligible for listing as endangered or threatened. For the purposes of the ESA, Congress defined species to include subspecies, varieties, and, for vertebrates, distinct population segments.

For ease of review, listed species are addressed in this attachment by county. No protocol surveys have taken place to date, and any noted observances took place during wetland delineations and field reviews occurring between October 2018 and May 2019.

#### I.1 COLUMBIA COUNTY

Ecologists evaluated the potential presence of listed species in Columbia and Suwannee counties. This assessment began by performing a records review of the U.S. Fish and Wildlife Service (USFWS) Information for Planning and Consultation (IPAC) report powered by the Environmental Conservation Online System, Florida Natural Areas Inventory (FNAI) Biodiversity Matrix, and Florida Fish and Wildlife Conservation Commission (FWC) geographic information system (GIS) records, including the wading bird and bald eagle nest databases. This information was supplemented by informal wildlife observations during the field review and wetland delineation surveys (Table I-1).

The environmental study area does not intersect known critical habitat for any federally listed species in Columbia County. The eastern portion of the proposed route falls within the consultation area for the red-cockaded woodpecker and within the core foraging area (CFA) of several recorded wood stork colonies, and multiple listed species are known or have the potential to occur in the study area.

Based on the results of the desktop and field investigations, the following species have been identified as being known to occur or having the moderate potential to occur within the Columbia County study area.

American Alligator (*Alligator mississippiensis*)—The alligator is listed as threatened by USFWS and FWC due to similarity of appearance to the American crocodile (*Crocodylus acutus*). Alligators are not uncommon in this part of the state, and this reptile is assumed present in the site's surface waters. Insofar as the project does not propose permanent impacts to surface waters, the American alligator is not expected to be affected.

Table I-1. Listed Species Table—Columbia County

Scientific Name	Common Name	Federal Listing	State Listing	Likelihood of Occurrence
Mammals				
Podomys floridanus	Florida mouse	N	N	Low†
Ursus americans floridanus	Florida black bear	N	N	Low‡
Sciuris niger shermani	Sherman's fox squirrel	N	N	Moderate†
Birds				
Haliaeetus leucocephalus	American eagle	N	N	*
Athene cunicularia floridana	Florida burrowing owl	N	T	Low
Grus canadensis pratensis	Florida sandhill crane	N	T	Moderate
Laterallus jamaicensis	Eastern black rail	С	N	Low
Egretta caerulea	Little blue heron	N	T	Moderate
Picoides borealis	Red-cockaded woodpecker	Е	Е	Low
Egretta thula	Snowy egret	N	N	†
Egretta tricolor	Tricolored heron	N	T	Moderate
Mycteria americana	Wood stork	T	T	Low
Reptiles				
Alligator mississippiensis	American alligator	FT	SAT	Moderate
Drymarchon couperi	Eastern indigo	T	T	Low
Pituophis melanoleucus	Florida pine snake	N	Т	Low
Gopherus polyphemus	Gopher tortoise	С	Т	Moderate (observed)
Amphibians				
Lithobates capito	Gopher frog	N	N	Low†
Notophthalmus perstriatus	Striped newt	С	N	Low
Fish				
Acipenser oxyrinchus	G 16 4	T	T	т
desotoi	Gulf sturgeon	T	T	Low
Plants				
Leitneria incisa	Corkwood	N	T	
Pycnanthemum floridanum	Florida mountain mint	N	T	
Matelea floridana	Florida spiny pod	N	Е	
Ctenium floridanum	Florida toothache grass	N	Е	
Salix floridana	Florida willow	N	Е	
Brickellia cordiolia	Flyr's brickell-bush	N	Е	
Hartwrightia floridana	Hartwrightia	N	T	
Agrimonia incisa	Incised groove-bur	N	T	
Litsea aestivalis	Pondspice	N	Е	
Pinguicula primuliflora	Primrose-flowered butterwort	N	Е	
Rhexia parviflora	Small-flowered meadowbeauty	N	Е	

<sup>\*</sup>Not Listed but protected under the Migratory Bird Treaty and the Bald and Golden Eagle Protection Act. †No longer listed in Florida as of January 11, 2017, but is a part of the Imperiled Species Management Plan. ‡Not listed but a species managed by FWC.

T = threatened.

E = endangered.

SSC = species of special concern.

N = not currently listed.

Eastern Indigo Snake (*Drymarchon corais couperi*)—Federally and state-listed as threatened. This distinctive large, black snake can occur in suitable habitats throughout Florida. It has a wide range of habitat preferences and prey species and requires large tracts of land for survival. Often considered a gopher tortoise commensal, it can be found in xeric habitats but also uses more mesic or wetland habitats for foraging. Suitable habitat is present for this species within the project footprint. However, because impacts are expected to be temporary and the habitat is to be restored postconstruction, the project will not preclude indigo snakes from using the site, as groundcover vegetation will be allowed to return, and human presence will be minimal during operation.

Because of the frequent association between eastern indigo snakes and gopher tortoises, the proposed plan recommends gopher tortoise burrow surveys be conducted prior to construction. Snakes discovered inhabiting burrows will be allowed to leave the area on their own during relocation of tortoises. In addition, USFWS's Standard Protection Measures for the Eastern Indigo Snake would also be implemented during project construction. These preconstruction surveys and standard protection measures will aid in minimizing adverse impacts to the eastern indigo snake within the project area.

Red-cockaded Woodpecker (*Picoides borealis*)—Federally and state-listed as endangered. The red-cockaded woodpecker makes its home in mature longleaf pine forests or trees inflicted with red-heart disease. The eastern edge of the study area (around the existing Raven substation site) falls within the consultation area for this species, although none were observed during the field review in Columbia County. While the species is not likely to be affected by transmission construction, a preconstruction survey for cavity trees would be recommended for forested areas near the transmission corridor where suitable habitat is present.

Wood Stork (*Mycteria americana*)—Federally listed as endangered. This large bird uses freshwater and estuarine habitats for nesting, roosting, and foraging. Wood storks typically construct their nests in medium to tall trees located in swamps or on islands surrounded by relatively broad expanses of open water. They are found across much of peninsular Florida. Wood storks tend to use the same colony sites over many years, as long as the sites remain undisturbed and sufficient feeding habitat remains in the surrounding wetlands. There are no known nesting colonies within 1.5 miles of the project area; however, individuals may forage in the water bodies or ditches in the project area. In north Florida, the wood stork CFA is a 13-mile radius around active nesting colonies where appropriate habitat exists. According to USFWS data, the proposed corridor intersects three wood stork CFAs.

The project is not expected to affect any colony site; however, there could be impacts to wetlands within a CFA. The proposed action will cross wetlands and ditches that could be used as foraging habitat. Impacts to herbaceous wetlands and hydrology are expected to be temporary during project construction.

Gopher Tortoise (*Gopherus polyphemus*)—Candidate species for federal listing by USFWS and state-listed as threatened. The gopher tortoise inhabits upland well-drained habitats throughout the state, including disturbed and urban properties. An informal gopher tortoise burrow survey was conducted concurrent with the wetland delineations, and multiple burrows were identified along the route. According to FWC regulations, relocation is not necessary if construction activities can avoid impacts within a 25-foot radius of the burrow entrance. However, if impacts

to any burrow cannot be avoided, a gopher tortoise relocation permit will be required from FWC. A 100-percent survey will be required prior to construction to locate all potentially occupied burrows and determine relocation and conservation measures.

Southern Fox Squirrel (formerly known as Sherman's Fox Squirrel) (*Sciurus niger niger*)—Recently approved for delisting. This squirrel prefers dry pine flatwoods, xeric oak, or sandhill communities but will inhabit pastures and other open disturbed habitats with scattered pines and oaks. Suitable habitat for this species exists within the environmental study area; however, no fox squirrels were observed during the field assessments. Due to the temporary nature of the construction disturbance, there is a low likelihood the species will be impacted by the project, and no further surveys are proposed. Recently delisted, this species is pending an update to the Imperiled Species Management Plan.

Florida Black Bear (*Ursus americans floridanus*)—Not federally or state-listed but managed by FWC. The environmental survey area is located within the East Panhandle and North bear management units. Documented species occurrence is abundant in the western portion of the environmental survey area, and occurrence in the eastern portion is occasional to common (FWC, 2012). Based on FWC's data, E&E anticipates a high potential for the presence of this species within the environmental survey area. No individuals were observed during the field assessment. Having construction crews maintain clean construction sites and store food and other wildlife-attractant refuse in bear-resistant garbage containers and mandating slower vehicular speeds in wooded areas at dawn and dusk during the June/July breeding season (if construction occurs during this timeframe) will minimize encounters between this species and construction crews and will minimize impacts to this species.

Little Blue Heron (*Egretta Caerulea*), Tricolored Heron (*Egretta tricolor*)—State-listed as threatened but not uncommon foraging in wetlands in north Florida. These wading bird species can be found in suitable wetland habitats throughout Florida. Foraging occurs in shallow freshwater, brackish, and saltwater habitats. Both species breed in colonial nesting sites with other wading and shorebird species. There are several freshwater marshes and man-made ditches within the project area that are potentially used for foraging by these species. The FWC Breeding Atlas does not contain any records of these birds breeding in the vicinity of the project study area, although there are records of little blue heron nesting colonies in Columbia County. The birds could potentially forage in habitats within the project environmental study area but are unlikely to nest there. No specific surveys for these birds are proposed; however, a preconstruction nest survey is recommended.

Florida Sandhill Crane (*Grus canadensis pratensis*)—Listed as threatened by FWC. The sandhill crane prefers freshwater marshes for nesting and pastures, wet prairies, or farm fields for foraging. Suitable nesting and foraging habitats are present in the study area, but no nests or individuals were observed foraging during the field assessment. Protections afforded to sandhill cranes under Chapter 8A-27, Florida Administrative Code (F.A.C.), are such that no person may take, possess, or sell any threatened species or their nests or eggs except as authorized by FWC rule or by permit from FWC. FWC's current permitting guidelines indicate activity should be avoided within 400 feet of nest sites during the breeding season. Insofar as sandhill cranes may nest within the project limits, the applicant will monitor the site for the presence of new nests should construction activities occur within the sandhill crane breeding season (January through March). Should any active nests be initiated within 400 feet of planned construction activities,

the applicant must either postpone construction in that area to coincide with the nonbreeding season or coordinate with FWC for issuance of an incidental take permit.

Preconstruction surveys for bird nests and tree cavities are recommended. If nests or cavities with eggs or flightless young are observed, work will be stopped immediately, and Gulf Power Company's (GPC's) Power Delivery Environmental Department will be contacted. Additionally, if an osprey nest or eagle nest is observed, GPC's Power Delivery Environmental Department will be contacted immediately.

<u>Gulf Sturgeon (Acipenser oxyrinchus desotoi)</u>—Federally and state-listed as threatened. This species is restricted to the Gulf of Mexico from Tampa Bay to Lake Ponchartrain. Its range includes the drainages of the Gulf of Mexico from the Mississippi River to the Suwannee River in Florida. The Gulf sturgeon lives in marine waters during most of its life, migrating to the tannic freshwater rivers to spawn.

In-water work is not anticipated in this project, and it is unlikely any direct impacts will result from construction of this proposed transmission line.

#### I.2 SUWANNEE COUNTY

Due to the similarity of Suwannee County species to those found in Columbia County, refer to Table I-2 (the county-specific table for Suwannee County), and the species descriptions within Section I.1, Columbia County.

Table I-2. Listed Species Table—Suwannee County

Scientific Name	Common Name	Federal Listing	State Listing	Likelihood of Occurrence
Mammals				
Podomys floridanus	Florida mouse	N	N	Low†
Ursus americans floridanus	Florida black bear	N	N	Low‡
Sciuris niger shermani	Shermans fox squirrel	N	N	Moderate†
Trichechus manatus	West Indian manatee	T	T	Low
Birds				
Haliaeetus leucocephalus	American eagle	N	N	*
Athene cunicularia floridana	Florida burrowing owl	N	T	Low
Grus canadensis pratensis	Florida sandhill crane	N	T	Moderate
Laterallus jamaicensis	Eastern black rail	С	N	Low
Egretta caerulea	Little blue heron	N	T	Moderate
Picoides borealis	Red-cockaded woodpecker	Е	Е	Low
Egretta thula	Snowy egret	N	N	†
Egretta tricolor	Tricolored heron	N	T	Moderate
Mycteria americana	Wood stork	T	T	Low
Reptiles				
Alligator mississippiensis	American alligator	FT	SAT	Moderate
Drymarchon couperi	Eastern indigo	T	T	Low
Pituophis melanoleucus	Florida pine snake	N	T	Low
Gopherus polyphemus	Gopher tortoise	С	T	Moderate (observed)
Macrochelys suwanniensis	Suwannee alligator snapping turtle	N	T	Low
Pseudemys concinna suwanniensis	Suwannee cooter	N	N	Low†
Amphibians				
Lithobates capito	Gopher frog	N	N	Low†
Notophthalmus perstriatus	Striped newt	С	N	Low
Fish	·			
Acipenser oxyrinchus desotoi	Gulf sturgeon	T	T	Low
Mollusks				
Medionidus walkeri	Suwannee moccasinshell	N	T	
Plants				
Carex chapmanii	Chapmans sedge	N	T	
Pycnanthemum floridanum	Florida mountain mint	N	T	
Matelea floridana	Florida spiny pod	N	Е	
Forestiera godfreyi	Godfrey's swampprivet	N	Е	
Pteroglossaspis ecristata	Giant orchid	N	T	
Agrimonia incisa	Incised groove-bur	N	T	
Litsea aestivalis	Pondspice	N	Е	
Rhexia parviflora	Small-flowered meadowbeauty	N	Е	

<sup>\*</sup>Not Listed but protected under the Migratory Bird Treaty and the Bald and Golden Eagle Protection Act. †No longer listed in Florida as of January 11, 2017, but is a part of the Imperiled Species Management Plan. ‡Not listed but a species managed by FWC.

T = threatened.

E = endangered.

SSC = species of special concern.

N = not currently listed.

# I.3 MADISON COUNTY

See Table I-3 for listed species in Madison County, and refer to the species descriptions within the previous other counties' sections.

The environmental survey area does not intersect known critical habitat for any federally listed species, nor does it traverse any USFWS consultation areas. Most of the survey area in Madison County is located within the CFA of several recorded wood stork colonies. Multiple listed species have the potential to occur or were observed in the environmental survey area (Table I-3). GPC will coordinate with USFWS and FWC for consultation on the potential for impacts to listed species and migratory birds before beginning construction activities.

Based on the results of the desktop and field investigations, the following species have been identified as being observed or having a high potential to occur within the environmental survey area. Where these species have been addressed in the sections for Columbia and Suwannee counites, they will not be reiterated.

Suwannee Alligator Snapping Turtle (*Macrochelys suwanniensis*)—State-listed as threatened. Recent studies have determined the Suwannee alligator snapping turtle is distinct from two relatives, of which all three were previously considered to be one species. This species range is limited to the Suwannee River watershed (FNAI, 2019), and its habitat is restricted to rivers, streams, floodplains, permanent freshwater habitats, and impoundments (FWC, 2018). No individuals were observed during the field assessment. However, suitable habitat is present in abundance within the environmental survey area; therefore, the potential for this species' occurrence within the environmental survey area is high. Avoidance and minimization measures include spanning all open water and maintaining construction setbacks from open water to avoid potential impacts to much of this species' suitable habitat. Additionally, the use of appropriate erosion control and sedimentation control best management practices (BMPs) and implementation of GPC's project-specific stormwater pollution prevention (SWPP) and spill prevention, control, and countermeasure (SPCC) plans are recommended when working in the vicinity of the Suwannee River and its tributaries to minimize sedimentation, turbidity, and water quality-related impacts to this species' habitat. If any direct impact to floodplains or permanently inundated wetlands is included within the project design, consultation is recommended with FWC to discuss measures to minimize impacts to this species.

Suwannee Moccasinshell (*Medionidus walker*)—State-listed as threatened. This small mussel generally inhabits larger streams with muddy sand or gravelly sand substrates and has documented populations within the main channel of the Suwannee River (USFWS, 2018). The project will cross the Suwanee River. Based on recent surveys of the species' distribution, the Suwannee moccasinshell has a high potential to occur within the survey area. However, construction will span the Suwannee River and maintain setbacks from the banks, which will avoid impacts to this species' habitat. The use of appropriate erosion control and sedimentation control BMPs and implementation of project-specific SWPP and SPCC plans are recommended when working in the vicinity of the Suwannee River and its tributaries to minimize sedimentation, turbidity, and water quality-related impacts to this species' habitat.

Table I-3. Listed Species Table—Madison County

Mammals	Scientific Name	Common Name	Federal Listing	State Listing	Likelihood of Occurrence	
Ursus americans floridanus Florida black bear Sciuris niger shermani Trichechus manatus West Indian manatee T T T Low Birds Haliaeetus leucoeephalus American eagle N N N \$  ### Haliaeetus leucoeephalus American eagle N N N *  ### Grus canadensis pratensis Florida sandhill crane N T Moderate Laterallus jamaicensis Eastern black rail C N Low Egretta caerulea Little blue heron N T Moderate Legretta due prateitus Egretta touen S N T Moderate Legretta touen S N T Moderate Picoides borealis Red-cockaded woodpecker E E Low Egretta tricolor Tricolored heron N T Moderate  #### Moderate Nycteria americana Wood stork T T Low #### Moderate Mycteria americana Wood stork T T Low #### Moderate Mycteria americana Wood stork T T Low #### Moderate Drymarchon couperi Eastern indigo T T T Low #### Moderate Drymarchon couperi Eastern indigo T T T Low #### Moderate Drymarchon couperi Eastern indigo T T Low #### Moderate Drymarchon couperi Eastern indigo T T T Low #### Moderate Drymarchon couperi Gopher tortoise C T Moderate (observed) #### Macrochelys squalachicolae Apalachicola alligator snapping turtle N N Low #### Macrochelys squalachicolae Apalachicola alligator snapping turtle N N Low #### Moderate Drymarchon coupri Suwanneensis Ambystoma cingulatum Frosted flatwoods salamander T T Low Holtosks ##### N N Low N Low N Low N Low **N Low	Mammals					
Sciuris niger shermani   Shermans fox squirrel   N   N   Moderate†	Podomys floridanus	Florida mouse	N	N	Low†	
Trichechus manatus   West Indian manatee   T   T   Low	Ursus americans floridanus	Florida black bear	N	N	Low‡	
Birds	Sciuris niger shermani	Shermans fox squirrel	N	N	Moderate†	
Haliaeetus leucocephalus	Trichechus manatus	West Indian manatee	T	T	Low	
Transcensis Enterpolatus Transcensis Frateris Florida sandhill crane Transcenadensis praterisis Florida sandhill crane N T Moderate Laterallus jamaicensis Eastern black rail C N Low Egretta carendea Little blue heron N T Moderate Picoides borealis Red-cockaded woodpecker E E E Low Egretta tricolor Tricolored heron N T Moderate Mycteria americana Wood stork T T T Low Reptiles  Reptiles  Reptiles  Reptiles  T T T Low  Reptiles  T T T Low  Reptiles  C T Moderate Drymarchon couperi Eastern indigo T T T Low  Gopherus polyphemus Gopher totoise Gopherus polyphemus Gopher totoise Gopherus polyphemus Gopherus polyphemus Gopherus polyphemus Suwannee alligator snapping turtle N T Low Macrochelys suwanniensis Macrochelys apalachicolae Apalachicola alligator snapping turtle N N Low Pseudemys concinna suwanniensis Suwannee cooter N N N Low†  Amphibians  Amphibians  T T Low  Lithobates capito Gopher frog N N N Low†  Notophthalmus perstriatus Striped newt C N Low  Striped newt C N Low  Striped newt C N Low  Bish  Acipenser oxyrinchus desoroi Gulf sturgeon T T T Low  Moderate (Day  Macrochelys sunanniemsis Medionidus walkeri Suwannee moccasinshell N T Low  Mollusks  Medionidus walkeri Suwannee moccasinshell N E  Phonathenum floridanum Florida flame azalea N E  Rhododendron austrinum Florida flower N E  Rhododendron incisa N E  Rhododendron N E  Rhododendr	Birds					
Laterallus jamaicensis   Eastern black rail   C   N   Low	Haliaeetus leucocephalus	American eagle	N	N	*	
Egretta caerulea         Little blue heron         N         T         Moderate           Picoides borealis         Red-cockaded woodpecker         E         E         Low           Egretta thicolor         Tricolored heron         N         N         †           Egretta tricolor         Wood stork         T         T         Low           Mycteria americana         Wood stork         T         T         Low           Reptiles           Alligator mississippiensis           American alligator         FT         SAT         Moderate           Drymarchon couperi         Eastern indigo         T         T         Low           Hittophis melanoleucus         Florida pine snake         N         T         Low           Gopher tortoise         C         T         Moderate (observed)           Macrochelys suwanniensis         Suwannee alligator snapping turtle         N         T         Low           Macrochelys suwanniensis         Suwannee alligator snapping turtle         N         N         Low           Macrochelys suwanniensis         Suwannee alligator snapping turtle         N         N         Low <t< td=""><td>Grus canadensis pratensis</td><td>Florida sandhill crane</td><td>N</td><td>T</td><td>Moderate</td></t<>	Grus canadensis pratensis	Florida sandhill crane	N	T	Moderate	
Picoides borealis         Red-cockaded woodpecker         E         E         Low           Egretta thula         Snowy egret         N         N         †           Egretta tricolor         Tricolored heron         N         T         Moderate           Mycteria americana         Wood stork         T         T         Low           Reptiles         T         T         T         Low           Alligator mississippiensis         American alligator         FT         SAT         Moderate           Drymarchon couperi         Eastern indigo         T         T         Low           Pituophis melanoleucus         Florida pine snake         N         T         Low           Opherus polysphemus         Gopher tortoise         C         T         Moderate (observed)           Macrochelys suwamiensis         Suwannee alligator snapping turtle         N         T         Low           Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low           Pseudenys concinna suwamniensis         Suwannee cooter         N         N         N         Low           Ambystoma cingulatum         Frosted flatwoods salamander         T         T         T         T	Laterallus jamaicensis	Eastern black rail	C	N		
Egretta thula         Snowy egret         N         N         †           Egretta tricolor         Tricolored heron         N         T         Moderate           Mycteria americana         Wood stork         T         T         T         Low           Reptiles         Alligator mississippiensis         American alligator         FT         SAT         Moderate           Drymarchon couperi         Eastern indigo         T         T         Low           Pituophis melanoleucus         Florida pine snake         N         T         Low           Gopher tortorise         C         T         Moderate (observed)           Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low           Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low           Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low           Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low           Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low           Macrochelys apalachicolae         Apalachicola alligator snap	Egretta caerulea	Little blue heron	N	T	Moderate	
Egretta tricolor         Tricolored heron         N         T         Moderate           Mycteria americana         Wood stork         T         T         Low           Reptities         S         S           Alligator mississippiensis         American alligator         FT         SAT         Moderate           Drymarchon couperi         Eastern indigo         T         T         Low           Pituophis melanoleucus         Florida pine snake         N         T         Low           Gopherus polyphemus         Gopher tortoise         C         T         Moderate (observed)           Macrochelys suwamiensis         Suwannee alligator snapping turtle         N         T         Low           Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low           Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low           Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low           Ambystoma cingulatum         Frosted flatwoods salamander         T         T         Low           Ambystoma cingulatum         Frosted flatwoods salamander         T         T         T         Low	Picoides borealis	Red-cockaded woodpecker	Е	Е	Low	
Mycteria americana         Wood stork         T         T         Low           Reptiles         Reptiles         Sat         Moderate           Alligator mississippiensis         American alligator         FT         SAT         Moderate           Drymarchon couperi         Eastern indigo         T         T         Low           Opher toriose         C         T         Moderate (observed)           Macrochelys polyphemus         Gopher tortoise         C         T         Moderate (observed)           Macrochelys suvanniensis         Suwannee alligator snapping turtle         N         T         Low           Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low           Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low           Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low           Mesudomys concinna suwanniensis         Suwannee cooter         N         N         N         Low           Ambystoma cingulatum         Frosted flatwoods salamander         T         T         T         Low           Motophthalmus perstriatus         Striped newt         C         N <td>Egretta thula</td> <td>Snowy egret</td> <td>N</td> <td>N</td> <td>†</td>	Egretta thula	Snowy egret	N	N	†	
Reptiles	Egretta tricolor	Tricolored heron	N	T	Moderate	
Alligator mississippiensis       American alligator       FT       SAT       Moderate         Drymarchon couperi       Eastern indigo       T       T       Low         Pituophis melanoleucus       Florida pine snake       N       T       Low         Gopherus polyphemus       Gopher tortoise       C       T       Moderate (observed)         Macrochelys suwamniensis       Suwannee alligator snapping turtle       N       T       Low         Macrochelys apalachicolae       Apalachicola alligator snapping turtle       N       N       Low         Pseudemys concinna suwamniensis       Suwannee cooter       N       N       Low         Ambystoma cingulatum       Frosted flatwoods salamander       T       T       Low         Lithobates capito       Gopher frog       N       N       Low†         Notophthalmus perstriatus       Striped newt       C       N       Low         Fish       S       Suriped newt       C       N       Low         Mollusks       S       Suriped newt       C       N       Low         Mollusks       Suriped newt       C       N       Low         Maligationidus walkeri       Suwannee moccasinshell       N       T	Mycteria americana	Wood stork	T	T	Low	
Drymarchon couperi         Eastern indigo         T         T         Low           Pituophis melanoleucus         Florida pine snake         N         T         Low           Gopher us polyphemus         Gopher tortoise         C         T         Moderate (observed)           Macrochelys suvamniensis         Suwannee alligator snapping turtle         N         T         Low           Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low           Pseudemys concinna suwamniensis         Suwannee cooter         N         N         Low†           Amphibians         Suwannee cooter         N         N         Low†           Amphibians         Suwannee mocasinsulatum         T         T         Low           Lithobates capito         Gopher frog         N         N         N         Low†           Notophthalmus perstriatus         Striped newt         C         N         Low           Fish         Suwannee mocasinshell         N         T         T         Low           Mollousks         Suwannee mocasinshell         N         T         T         Low           Magnolia ashei         Ashe's magnolia         N         E         E         P <td>Reptiles</td> <td></td> <td></td> <td></td> <td></td>	Reptiles					
Pituophis melanoleucus         Florida pine snake         N         T         Low           Gopherus potyphemus         Gopher tortoise         C         T         Moderate (observed)           Macrochelys suwanniensis         Suwannee alligator snapping turtle         N         N         Low           Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low           Pseudemys concinna suwanniensis         Suwannee cooter         N         N         Low†           Amphibians	Alligator mississippiensis	American alligator	FT	SAT	Moderate	
Gopherus polyphemus         Gopher tortoise         C         T         Moderate (observed)           Macrochelys suwanniensis         Suwannee alligator snapping turtle         N         T         Low           Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low           Pseudemys concinna suwanniensis         Suwannee cooter         N         N         Low†           Amphibians         Suwannee cooter         N         N         Low†           Ampstoma cingulatum         Frosted flatwoods salamander         T         T         Low           Lithobates capito         Gopher frog         N         N         Low†           Notophthalmus perstriatus         Striped newt         C         N         Low           Wollusks         Striped newt         C         N         Low           Mollusks         Suwannee moccasinshell         N         T         Low           Mollusks         Suwannee moccasinshell         N         T         E           Plants         Suwannee moccasinshell         N         T         E           Magnolia ashei         Ashe's magnolia         N         E         E           Pycnanthemum floridanum         Florida flam	Drymarchon couperi	Eastern indigo	T	T	Low	
Gopherus polyphemus         Gopher tortoise         C         T         Moderate (observed)           Macrochelys suwanniensis         Suwannee alligator snapping turtle         N         T         Low           Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low           Pseudemys concinna suwanniensis         Suwannee cooter         N         N         Low†           Amphibians         Suwannee cooter         N         N         Low†           Ambystoma cingulatum         Frosted flatwoods salamander         T         T         Low           Motophthalmus perstriatus         Striped newt         C         N         Low†           Notophthalmus perstriatus         Striped newt         C         N         Low           Mollusks         Supannee mocrasinshell         T         T         Low           Mollusks         Suwannee moccasinshell         N         T         T           Medionidus walkeri         Suwannee moccasinshell         N         T         E           Plants         Suwannee moccasinshell         N         T         E         E           Magnolia ashei         Ashe's magnolia         N         E         E         E	Pituophis melanoleucus	Florida pine snake	N	T	Low	
Macrochelys suwanniensis         Suwannee alligator snapping turtle         N         T         Low           Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low†           Pseudemys concinna suwanniensis         Suwannee cooter         N         N         N         Low†           Amphibians			С	T	Moderate (observed)	
Macrochelys apalachicolae         Apalachicola alligator snapping turtle         N         N         Low           Pseudemys concinna suwanniensis         Suwannee cooter         N         N         Low†           Amphibians         Beach of the property of			N	T	` ` `	
Pseudemys concinna suwanniensis         Suwannee cooter         N         N         Low†           Amphibians         Ambystoma cingulatum         Frosted flatwoods salamander         T         T         Low           Lithobates capito         Gopher frog         N         N         N         Low†           Notophithalmus perstriatus         Striped newt         C         N         Low           Fish          Gulf sturgeon         T         T         Dow           Mollusks          Gulf sturgeon         T         T         Low           Medionidus walkeri          Suwannee moccasinshell         N         T           Plants           Magnolia ashei         Ashe's magnolia         N         E           Rhododendron austrinum         Florida flame azalea         N         E           Pycnanthemum floridanum         Florida flame azalea         N         E           Pycnanthemum floridanum         Florida spiny pod         N         E           Brickellia cordifolia         Flyr's brickell-bush         N         E           Brickellia cordifolia         Flyr's brickell-bush         N         E	Macrochelys apalachicolae		N	N	Low	
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Lithobates capito       Gopher frog       N       N       Low†         Notophthalmus perstriatus       Striped newt       C       N       Low         Fish       Striped newt       C       N       Low         Mollusks       Suwannee moccasinshell       T       T       T       Low         Mollusks         Medionidus walkeri       Suwannee moccasinshell       N       T         Plants         Magnolia ashei       A She's magnolia       N       E         Plants         Magnolia ashei       A She's magnolia       N       E         Plants         Magnolia ashei       A She's magnolia       N       E         Plants       N       E         Plants         Magnolia ashei       A She's magnolia       N       E         Magnolia ashei       A She's magnolia       N       E         Plants       Plants       Plants       Plants       Plan	Ambystoma cingulatum	Frosted flatwoods salamander	T	T	Low	
Striped newt   C N Low		Gopher frog	N	N	Low†	
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Brickellia cordifolia       Flyr's brickell-bush       N       E         Macranthera flammea       Hummingbird flower       N       E         Agrimonia incisa       Incised groove-bur       N       T         Xyris longisepala       Karst pond xyris       N       E         Ruellia noctiflora       Nightflowering wild petunia       N       E         Rhexia salicifolia       Panhandle meadowbeauty       N       T         Andropogon arctatus       Pine-woods bluestem       N       T         Litsea aestivalis       Pondspice       N       E         Rhexia parviflora       Small-flowered meadowbeauty       N       E         Platanthera integra       Yellow fringeless orchid       N       E         Sarracenia leucophylla       White-top pitcherplant       N       E	·					
Macranthera flammea       Hummingbird flower       N       E         Agrimonia incisa       Incised groove-bur       N       T         Xyris longisepala       Karst pond xyris       N       E         Ruellia noctiflora       Nightflowering wild petunia       N       E         Rhexia salicifolia       Panhandle meadowbeauty       N       T         Andropogon arctatus       Pine-woods bluestem       N       T         Litsea aestivalis       Pondspice       N       E         Rhexia parviflora       Small-flowered meadowbeauty       N       E         Platanthera integra       Yellow fringeless orchid       N       E         Sarracenia leucophylla       White-top pitcherplant       N       E				Е		
Agrimonia incisa       Incised groove-bur       N       T         Xyris longisepala       Karst pond xyris       N       E         Ruellia noctiflora       Nightflowering wild petunia       N       E         Rhexia salicifolia       Panhandle meadowbeauty       N       T         Andropogon arctatus       Pine-woods bluestem       N       T         Litsea aestivalis       Pondspice       N       E         Rhexia parviflora       Small-flowered meadowbeauty       N       E         Platanthera integra       Yellow fringeless orchid       N       E         Sarracenia leucophylla       White-top pitcherplant       N       E						
Xyris longisepala       Karst pond xyris       N       E         Ruellia noctiflora       Nightflowering wild petunia       N       E         Rhexia salicifolia       Panhandle meadowbeauty       N       T         Andropogon arctatus       Pine-woods bluestem       N       T         Litsea aestivalis       Pondspice       N       E         Rhexia parviflora       Small-flowered meadowbeauty       N       E         Platanthera integra       Yellow fringeless orchid       N       E         Sarracenia leucophylla       White-top pitcherplant       N       E						
Ruellia noctiflora       Nightflowering wild petunia       N       E         Rhexia salicifolia       Panhandle meadowbeauty       N       T         Andropogon arctatus       Pine-woods bluestem       N       T         Litsea aestivalis       Pondspice       N       E         Rhexia parviflora       Small-flowered meadowbeauty       N       E         Platanthera integra       Yellow fringeless orchid       N       E         Sarracenia leucophylla       White-top pitcherplant       N       E						
Rhexia salicifolia       Panhandle meadowbeauty       N       T         Andropogon arctatus       Pine-woods bluestem       N       T         Litsea aestivalis       Pondspice       N       E         Rhexia parviflora       Small-flowered meadowbeauty       N       E         Platanthera integra       Yellow fringeless orchid       N       E         Sarracenia leucophylla       White-top pitcherplant       N       E						
Andropogon arctatus       Pine-woods bluestem       N       T         Litsea aestivalis       Pondspice       N       E         Rhexia parviflora       Small-flowered meadowbeauty       N       E         Platanthera integra       Yellow fringeless orchid       N       E         Sarracenia leucophylla       White-top pitcherplant       N       E						
Litsea aestivalis       Pondspice       N       E         Rhexia parviflora       Small-flowered meadowbeauty       N       E         Platanthera integra       Yellow fringeless orchid       N       E         Sarracenia leucophylla       White-top pitcherplant       N       E	·	ž				
Rhexia parviflora       Small-flowered meadowbeauty       N       E         Platanthera integra       Yellow fringeless orchid       N       E         Sarracenia leucophylla       White-top pitcherplant       N       E						
Platanthera integra       Yellow fringeless orchid       N       E         Sarracenia leucophylla       White-top pitcherplant       N       E						
Sarracenia leucophylla White-top pitcherplant N E						
	Xyris scabrifolia	Harper's yellow-eyed grass	N	T		

T = threatened.

E = endangered.

SSC = species of special concern.

N = not currently listed.

<sup>\*</sup>Not Listed but protected under the Migratory Bird Treaty and the Bald and Golden Eagle Protection Act. †No longer listed in Florida as of January 11, 2017, but is a part of the Imperiled Species Management Plan.

<sup>‡</sup>Not listed but a species managed by FWC.

<u>Frosted Flatwoods Salamander (Ambystoma cingulatum)</u>—Federally listed as threatened. This small salamander has an indistinct, white to silvery-gray pattern on a black background with a very dark belly with discrete white spots. This salamander inhabits mesic flatwoods, wet flatwoods, and wet prairie communities with wiregrass groundcover and scattered wetlands often dominated by cypress or gum, breeding in ephemeral ponds that lack predatory fish and which usually have some emergent herbaceous vegetation. Not highly tolerant of disturbance.

<u>West Indian Manatee (Trichechus manatus)</u>—Federally listed as threatened. This large marine mammal is found in fresh, brackish, and marine waters throughout Florida and is dependent on areas with access to aquatic vegetation and fresh water sources. In the winter months, manatees seek refuge in areas with warmer water, including man-made warmwater sources or spring-fed rivers such as the Suwannee River. The project is not anticipated to include any in-water work and is therefore not expected to impact the manatee.

#### I.4 JEFFERSON COUNTY

See Table I-4 for listed species in Jefferson County, and refer to the species descriptions within the previous other counties' sections.

The same species have the likelihood to occur in Jefferson as the counties previously described. During field efforts, gopher tortoise burrows were observed within the environmental survey area.

Table I-4. Listed Species Table—Jefferson County

Scientific Name	Common Name	Federal Listing	State Listing	Likelihood of Occurrence
Mammals				
Ursus americans floridanus	Florida black bear	N	N	Low‡
Sciuris niger shermani	Sherman's fox squirrel	N	N	Moderate†
Birds	·			
Haliaeetus leucocephalus	American eagle	N	N	*
Grus canadensis pratensis	Florida sandhill crane	N	T	Moderate
Laterallus jamaicensis	Eastern black rail	С	N	Low
Egretta caerulea	Little blue heron	N	T	Moderate
Picoides borealis	Red-cockaded woodpecker	Е	Е	Low
Egretta thula	Snowy egret	N	N	†
Egretta tricolor	Tricolored heron	N	Т	Moderate
Mycteria americana	Wood stork	T	Т	Low
Reptiles				
Alligator mississippiensis	American alligator	FT	SAT	Moderate
Drymarchon couperi	Eastern indigo	T	T	Low
Pituophis melanoleucus	Florida pine snake	N	T	Low
Gopherus polyphemus	Gopher tortoise	C	T	Moderate (observed)
Macrochelys apalachicolae	Apalachicola alligator snapping turtle	N	N	Low
Pseudemys concinna suwanniensis	Suwannee cooter	N	N	Low†
Amphibians	Suvamice cotter	11	11	Low
Ambystoma cingulatum	Frosted flatwoods salamander	T	T	Low
Lithobates capito	Gopher frog	N	N	Low†
Notophthalmus perstriatus	Striped newt	C	N	Low
Fish	Surped newt	C	11	LOW
Acipenser oxyrinchus desotoi	Gulf sturgeon	Т	Т	Low
Plants	Guii sturgeon	1	1	LOW
Rhododendron alabamense	Alabama rhododendron	N	Е	
Matelea alabamensis	Alabama spiny-pod	N	E	
Magnolia ashei	Ashe's magnolia	N	E	
Carex baltzellii	Baltzell's sedge	N	T	
Rhododendron austrinum	Florida flame azalea	N	E	
	Florida marrybells	N N	E	
Uvularia floridana	-	N N	T	
Pycnanthemum floridanum	Florida mountain mint			
Matelea floridana	Florida spiny pod Florida willow	N N	E E	
Salix floridana		N N	E E	
Brickellia cordifolia	Flyr's brickell-bush			
Forestiera godfreyi	Godfrey's swampprivet	N	Е	
Xyris scabrifolia	Harper's yellow-eyed grass	N	T	
Agrimonia incisa	Incised groove-bur	N	T	
Xyris longisepala	Karst pond xyris	N	Е	
Ruellia noctiflora	Nightflowering wild petunia	N	Е	
Rhexia salicifolia	Panhandle meadowbeauty	N	T	
Andropogon arctatus	Pine-woods bluestem	N	T	
Phyllanthus liebmannianus ssp. platylepis	Pinewoods dainties	N	Е	
Litsea aestivalis	Pondspice	N	E	
Rhexia parviflora	Small-flowered meadowbeauty	N	Е	
Calamintha dentata	Toothed savory	N	Т	
Sarracenia leucophylla	White-top pitcherplant	N	Е	
Platanthera integra	Yellow fringeless orchid	N	Е	
Pityopsis flexuosa	Zigzag silkgrass	N	Е	

<sup>\*</sup>Not Listed but protected under the Migratory Bird Treaty and the Bald and Golden Eagle Protection Act. †No longer listed in Florida as of January 11, 2017, but is a part of the Imperiled Species Management Plan.

T =threatened. E =endangered.

SSC = species of special co N = not currently listed. species of special concern.

<sup>‡</sup>Not listed but a species managed by FWC.

# I.5 LEON COUNTY

See Table I-5 for listed species in Leon County, and refer to the species descriptions within the previous other counties' sections.

Based on the results of the desktop and field investigations, the following species have been identified as being observed or having a potential to occur within the environmental survey area. Species included in the previous counties will not be reiterated here.

<u>Gray Bat (Myotis grisescens)</u>—No critical habitat designated for the gray bat, but federally listed as endangered wherever found. The gray bat inhabits caves and feeds over waterways surrounded by forests. North Florida is the southern extent of the gray bat range, including Leon, Gadsden, and Jackson counties. There are only a few caves in the panhandle of Florida that serve as roost sites for this endangered bat.

<u>Red-cockaded Woodpecker</u>—Recorded colonies of red-cockaded woodpecker exist within the Apalachicola National Forest, and cavity trees were observed by staff ecologists during field surveys. Consultation with USFWS for this species is recommended to determine what surveys would be recommended for forested areas near the transmission corridor and what measures can be taken to reduce the potential for impacts to this species during project construction and operation.

Mollusks—The environmental study area intersects critical habitat for five federally listed mollusk species: fat threeridge (*Amblema neislerii*), purple bankclimber (*Elliptoideus sloatianus*), Ochlockonee moccasinshell (*Medionidus simpsonianus*), oval pigtoe (*Pleurobema pyriforme*), and shinyrayed pocketbook (*Lampsilis subangulata*). Critical habitat for these species is limited to the open channelized portion of the Ochlockonee and Apalachicola rivers. Consultation with the appropriate agencies will help determine whether impacts to these listed mussels can be mitigated by employment of BMPs.

Table I-5. Listed Species Table—Leon County

Scientific Name	Common Name	Federal Listing	State Listing	Likelihood of Occurrence
Mammals				
Ursus americans floridanus	Florida black bear	N	N	Low‡
Myotis grisescens	Gray bat	Е	Е	Low
Sciuris niger shermani	Sherman's fox squirrel	N	N	Moderate†
Birds				
Haliaeetus leucocephalus	American eagle	N	N	*
Grus canadensis pratensis	Florida sandhill crane	N	T	Moderate
Laterallus jamaicensis	Eastern black rail	С	N	Low
Egretta caerulea	Little blue heron	N	T	Moderate
Picoides borealis	Red-cockaded woodpecker	Е	Е	Moderate (observed)
Egretta thula	Snowy egret	N	N	Ť
Egretta tricolor	Tricolored heron	N	T	Moderate
Mycteria americana	Wood stork	T	Т	Low
Reptiles				
Alligator mississippiensis	American alligator	FT	SAT	Moderate
Graptemys barbouri	Barbour's map turtle	N	SSC	Low
Drymarchon couperi	Eastern indigo	T	T	Low
Pituophis melanoleucus	Florida pine snake	N	T	Low
Gopherus polyphemus	Gopher tortoise	C	T	Moderate (observed)
Macrochelys apalachicolae	Apalachicola alligator snapping turtle	N	N	Low
Pseudemys concinna suwanniensis	Suwannee cooter	N	N	Low†
Amphibians	Suwannee cooter	11	11	LOW
Ambystoma cingulatum	Frosted flatwoods salamander	T	T	Low
Lithobates capito	Gopher frog	N	N	Low†
Fish	Gopher Hog	IN	11	LUW
Acipenser oxyrinchus desotoi	Gulf sturgeon	Т	Т	Low
Alosa alabamae	Alabama shad	SC	N	Low
Mollusks	Alabama shaq	50	11	LUW
Amblema neislerii	Fat threeridge	Е	Е	Low
Elliptoideus sloatianus	Purple bankclimber	T	T	Low
Plants	1 dipic bankeninoei	1	1	LOW
Matelea alabamensis	Alabama spiny-pod	N	Е	
Pachysandra procumbens	Allegheny spurge	N	E	
Cornus alternifolia	Alternate-leaf dogwood	N	E	
Staphylea trifolia	American bladdernut	N	E	
Conradina glabra	Apalachicola rosemary	E	E	
Baptisia megacarpa	Apalachicola wild indigo	N	E	
Magnolia ashei	Ashe's magnolia	N	E	
·		N N	E	
Matelea baldwyniana Carex baltzellii	Baldwyn's spiny-pod		T	
	Baltzell's sedge	N		
Schisandra glabra	Bay star-vine	N	Е	
Lobelia boykinii	Boykin's lobelia	N	Е	
Sideroxylon lycioides	Buckthorn	N	Е	
Euonymus atropurpureus	Burningbush	N	E	
Matelea flavidula	Carolina milkvine	N	E	
Rhododendron chapmanii	Chapman's rhododendron	E	E	
Croomia pauciflora	Croomia	N	E	
Lythrum curtissii	Curtiss' loosestrife	N	Е	
Dirca palustris	Eastern leatherwood	N	E	
Veratrum woodii	False hellebore	N	Е	

Table I-5. Listed Species Table—Leon County (Continued, Page 2 of 2)

Scientific Name	Common Name	Federal Listing	State Listing	Likelihood of Occurrence
Rhododendron austrinum	Florida flame azalea	N	Е	
Uvularia floridana	Florida merrybells	N	Е	
Matelea floridana	Florida spiny pod	N	Е	
Torreya taxifolia	Florida torreya	Е	Е	
Taxus floridana	Florida yew	N	Е	
Brickellia cordifolia	Flyr's brickell-bush	N	Е	
Silene polypetala	Fringed campion	Е	Е	
Spigelia gentianoides	Gentian pinkroot	Е	Е	
Forestiera godfreyi	Godfrey's swampprivet	N	Е	
Rhynchospora crinipes	Hairy-peduncled beaksedge	N	Е	
Xyris scabrifolia	Harper's yellow-eyed grass	N	T	
Agrimonia incisa	Incised groove-bur	N	T	
Xyris longisepala	Karst pond xyris	N	Е	
Hepatica nobilis	Liverleaf	N	Е	
Aquilegia canadensis var. australis	Marianna columbine	N	Е	
Trillium lancifolium	Narrow-leaved trillium	N	Е	
Ruellia noctiflora	Nightflowering wild petunia	N	Е	
Bigelowia nuttallii	Nuttall's rayless goldenrod	N	Е	
Andropogon arctatus	Pine-woods bluestem	N	T	
Pinguicula primuliflora	Primrose-flowered butterwort	N	Е	
Magnolia pyramidata	Pyramid magnolia	N	Е	
Thalictrum thalictroides	Rue-anemone	N	Е	
Rhexia parviflora	Small-flowered meadowbeauty	N	Е	
Calamintha dentata	Toothed savory	N	T	
Arnoglossum diversifolium	Variable-leaved Indian-plantain	N	T	
Linum westii	West's flax	N	Е	
Sarracenia leucophylla	White-top pitcherplant	N	Е	
Euphorbia commutata	Wood spurge	N	Е	
Platanthera integra	Yellow fringeless orchid	N	Е	
Xanthorhiza simplicissima	Yellow-root	N	Е	

<sup>\*</sup>Not Listed but protected under the Migratory Bird Treaty and the Bald and Golden Eagle Protection Act. †No longer listed in Florida as of January 11, 2017, but is a part of the Imperiled Species Management Plan. ‡Not listed but a species managed by FWC.

T = threatened.

E = endangered.

SSC = species of special concern.

N = not currently listed.

### I.6 GADSDEN COUNTY

See Table I-6 for listed species in Gadsden County, and refer to the species descriptions within the previous other counties' sections.

No additional listed species were identified for Gadsden County; however, this section of the environmental survey area crosses the Apalachicola River. At this time, in-water work is not anticipated to be required, and BMPs and erosion control methods will be used to minimize secondary impacts to listed mussels in the Apalachicola River channels.

#### I.7 JACKSON COUNTY

See Table I-7 for listed species in Jackson County, and refer to the species descriptions within the previous other counties' sections.

Reticulated flatwoods salamander (*Ambystoma bishopi*)—Federally listed as endangered wherever found. Habitat for mature salamanders consists of upland areas with few trees, typically longleaf pines, and grasses. They prefer poorly drained sand, which leads to seasonal ponds and damp surroundings. This salamander's habitat will often have an open overstory of widely scattered longleaf pine, little to no midstory, and a diverse community of low-growing shrubs, which include highly diverse forb and grass communities. In their larval stages, the reticulated flatwoods salamander occupies acidic ephemeral wetlands. These wetlands have varying amounts of vegetation and lack dense midstory growth. Canopy is comprised of a typical Florida wetland assemblage.

Table I-6. Listed Species Table—Gadsden County

Scientific Name	Common Name	Federal Listing	State Listing	Likelihood of Occurrence
Mammals				
Ursus americans floridanus	Florida black bear	N	N	Low‡
Myotis grisescens	Gray bat	Е	Е	Low
Sciuris niger shermani	Sherman's fox squirrel	N	N	Moderate†
Birds	·			
Haliaeetus leucocephalus	American eagle	N	N	*
Grus canadensis pratensis	Florida sandhill crane	N	T	Moderate
Laterallus jamaicensis	Eastern black rail	С	N	Low
Egretta caerulea	Little blue heron	N	T	Moderate
Picoides borealis	Red-cockaded woodpecker	Е	Е	Low
Egretta thula	Snowy egret	N	N	†
Egretta tricolor	Tricolored heron	N	T	Moderate
Mycteria americana	Wood stork	T	T	Low
Reptiles				
Alligator mississippiensis	American alligator	FT	SAT	Moderate
Graptemys barbouri	Barbour's map turtle	N	SSC	Low
Drymarchon couperi	Eastern indigo	Т	T	Low
Pituophis melanoleucus	Florida pine snake	N	T	Low
Gopherus polyphemus	Gopher tortoise	С	T	Moderate (observed)
Macrochelys apalachicolae	Apalachicola alligator snapping turtle	N	N	Low
Pseudemys concinna suwanniensis	Suwannee cooter	N	N	Low†
Amphibians				
Ambystoma cingulatum	Frosted flatwoods salamander	T	Т	Low
Lithobates capito	Gopher frog	N	N	Low†
Fish				
Acipenser oxyrinchus desotoi	Gulf sturgeon	T	T	Low
Alosa alabamae	Alabama shad	SC	N	Low
Mollusks				
Amblema neislerii	Fat threeridge	Е	Е	Low
Elliptoideus sloatianus	Purple bankclimber	T	T	Low
Plants	·			
Matelea alabamensis	Alabama spiny-pod	N	Е	
Pachysandra procumbens	Allegheny spurge	N	Е	
Cornus alternifolia	Alternate-leaf dogwood	N	Е	
Staphylea trifolia	American bladdernut	N	Е	
Conradina glabra	Apalachicola rosemary	Е	Е	
Baptisia megacarpa	Apalachicola wild indigo	N	Е	
Magnolia ashei	Ashe's magnolia	N	Е	
Matelea baldwyniana	Baldwyn's spiny-pod	N	Е	
Carex baltzellii	Baltzell's sedge	N	T	
Schisandra glabra	Bay star-vine	N	Е	
Lobelia boykinii	Boykin's lobelia	N	Е	
Sideroxylon lycioides	Buckthorn	N	Е	
Euonymus atropurpureus	Burningbush	N	Е	
Matelea flavidula	Carolina milkvine	N	Е	
Rhododendron chapmanii	Chapman's rhododendron	Е	Е	
Croomia pauciflora	Croomia	N	Е	
Lythrum curtissii	Curtiss' loosestrife	N	Е	
Dirca palustris	Eastern leatherwood	N	Е	

Table I-6. Listed Species Table—Gadsden County (Continued, Page 2 of 2)

Scientific Name	Common Name	Federal Listing	State Listing	Likelihood of Occurrence
Veratrum woodii	False hellebore	N	Е	
Rhododendron austrinum	Florida flame azalea	N	Е	
Uvularia floridana	Florida merrybells	N	Е	
Matelea floridana	Florida spiny pod	N	Е	
Torreya taxifolia	Florida torreya	Е	Е	
Taxus floridana	Florida yew	N	Е	
Brickellia cordifolia	Flyr's brickell-bush	N	Е	
Silene polypetala	Fringed campion	Е	Е	
Spigelia gentianoides	Gentian pinkroot	Е	Е	
Forestiera godfreyi	Godfrey's swampprivet	N	Е	
Rhynchospora crinipes	Hairy-peduncled beaksedge	N	Е	
Xyris scabrifolia	Harper's yellow-eyed grass	N	T	
Agrimonia incisa	Incised groove-bur	N	T	
Xyris longisepala	Karst pond xyris	N	Е	
Hepatica nobilis	Liverleaf	N	Е	
Aquilegia canadensis var. australis	Marianna columbine	N	Е	
Trillium lancifolium	Narrow-leaved trillium	N	Е	
Ruellia noctiflora	Nightflowering wild petunia	N	Е	
Bigelowia nuttallii	Nuttall's rayless goldenrod	N	Е	
Andropogon arctatus	Pine-woods bluestem	N	T	
Pinguicula primuliflora	Primrose-flowered butterwort	N	Е	
Magnolia pyramidata	Pyramid magnolia	N	Е	
Thalictrum thalictroides	Rue-anemone	N	Е	
Rhexia parviflora	Small-flowered meadowbeauty	N	Е	
Calamintha dentata	Toothed savory	N	T	
Arnoglossum diversifolium	Variable-leaved Indian-plantain	N	T	
Linum westii	West's flax	N	Е	
Sarracenia leucophylla	White-top pitcherplant	N	Е	
Euphorbia commutata	Wood spurge	N	Е	
Platanthera integra	Yellow fringeless orchid	N	Е	
Xanthorhiza simplicissima	Yellow-root	N	Е	

<sup>\*</sup>Not Listed but protected under the Migratory Bird Treaty and the Bald and Golden Eagle Protection Act. †No longer listed in Florida as of January 11, 2017, but is a part of the Imperiled Species Management Plan. ‡Not listed but a species managed by FWC.

T = threatened.E = endangered.

SSC = species of special concern.

N = not currently listed.

Table I-7. Listed Species Table—Jackson County

Scientific Name	Common Name	Federal Listing	State Listing	Likelihood of Occurrence
Mammals				
Ursus americans floridanus	Florida black bear	N	N	Low‡
Myotis grisescens	Gray bat	Е	Е	Low
Sciuris niger shermani	Sherman's fox squirrel	N	N	Moderate†
Birds				
Haliaeetus leucocephalus	American eagle	N	N	*
Grus canadensis pratensis	Florida sandhill crane	N	T	Moderate
Laterallus jamaicensis	Eastern black rail	С	N	Low
Egretta caerulea	Little blue heron	N	T	Moderate
Picoides borealis	Red-cockaded woodpecker	Е	Е	Low
Egretta thula	Snowy egret	N	N	†
Egretta tricolor	Tricolored heron	N	T	Moderate
Mycteria americana	Wood stork	T	T	Low
Reptiles				
Alligator mississippiensis	American alligator	FT	SAT	Moderate
Graptemys barbouri	Barbour's map turtle	N	SSC	Low
Drymarchon couperi	Eastern indigo	T	T	Low
Pituophis melanoleucus	Florida pine snake	N	T	Low
Gopherus polyphemus	Gopher tortoise	С	T	Moderate (observed)
Macrochelys apalachicolae	Apalachicola alligator snapping turtle	N	N	Low
Pseudemys concinna suwanniensis	Suwannee cooter	N	N	Low†
Amphibians				
Ambystoma cingulatum	Frosted flatwoods salamander	T	T	Low
Lithobates capito	Gopher frog	N	N	Low†
Ambystoma bishopi	Reticulated flatwoods salamander	Е	Е	Low
Fish				
Acipenser oxyrinchus desotoi	Gulf sturgeon	T	T	Low
Alosa alabamae	Alabama shad	SC	N	Low
Mollusks				
Amblema neislerii	Fat threeridge	Е	Е	Low
Elliptoideus sloatianus	Purple bankclimber	T	T	Low
Hamiota subangulata	Shiney-rayed pocketbook	Е	Е	
Plants				
Matelea alabamensis	Alabama spiny-pod	N	Е	
Conradina glabra	Apalachicola rosemary	Е	Е	
Baptisia megacarpa	Apalachicola wild indigo	N	Е	
Magnolia ashei	Ashe's magnolia	N	Е	
Matelea baldwyniana	Baldwyn's spiny-pod	N	Е	
Carex baltzellii	Baltzell's sedge	N	T	
Schisandra glabra	Bay star-vine	N	Е	
Lobelia boykinii	Boykin's lobelia	N	Е	
Cryptotaenia canadensis	Canada honewort	N	Е	
Rhododendron chapmanii	Chapman's rhododendron	Е	Е	
Desmodium ochroleucum	Creamflower tick-trefoil	N	Е	
Croomia pauciflora	Croomia	N	Е	
Lythrum curtissii	Curtiss' loosestrife	N	Е	
Rhododendron austrinum	Florida flame azalea	N	Е	
Uvularia floridana	Florida merrybells	N	Е	
Matelea floridana	Florida spiny pod	N	Е	
Torreya taxifolia	Florida torreya	Е	Е	

Table I-7. Listed Species Table—Jackson County (Continued, Page 2 of 2)

Scientific Name	Common Name	Federal Listing	State Listing	Likelihood of Occurrence
Taxus floridana	Florida yew	N	Е	
Brickellia cordifolia	Flyr's brickell-bush	N	Е	
Silene polypetala	Fringed campion	Е	Е	
Spigelia gentianoides	Gentian pinkroot	Е	Е	
Forestiera godfreyi	Godfrey's swampprivet	N	Е	
Rhynchospora crinipes	Hairy-peduncled beaksedge	N	Е	
Xyris scabrifolia	Harper's yellow-eyed grass	N	T	
Macranthera flammea	Hummingbird flower	N	Е	
Agrimonia incisa	Incised groove-bur	N	T	
Xyris longisepala	Karst pond xyris	N	Е	
Aquilegia canadensis var. australis	Marianna columbine	N	Е	
Trillium lancifolium	Narrow-leaved trillium	N	Е	
Ruellia noctiflora	Nightflowering wild petunia	N	Е	
Rhexia salicifolia	Panhandle meadowbeauty	N	T	
Andropogon arctatus	Pine-woods bluestem	N	T	
Pinguicula primuliflora	Primrose-flowered butterwort	N	Е	
Stachys hyssopifolia var. lythroides	Tallahassee hedge-nettle	N	Е	
Thalictrum thalictroides	Rue-anemone	N	Е	
Rhexia parviflora	Small-flowered meadowbeauty	N	Е	
Calamintha dentata	Toothed savory	N	T	
Arnoglossum diversifolium	Variable-leaved Indian-plantain	N	T	
Linum westii	West's flax	N	Е	
Sarracenia leucophylla	White-top pitcherplant	N	Е	
Platanthera integra	Yellow fringeless orchid	N	Е	

<sup>\*</sup>Not Listed but protected under the Migratory Bird Treaty and the Bald and Golden Eagle Protection Act. †No longer listed in Florida as of January 11, 2017, but is a part of the Imperiled Species Management Plan. ‡Not listed but a species managed by FWC.

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N = not currently listed.

# I.8 ALL COUNTIES—MIGRATORY BIRDS

USFWS's IPAC report identified additional migratory bird species that are not included within the listed species' tables of previous sections. Migratory birds are protected under the Migratory Bird Treaty Act of 1918 (MBTA), which makes it unlawful to kill or "take" a migratory bird, nest, or egg. An amendment to the MBTA in 1972 resulted in inclusion of bald eagles and other birds of prey in the definition of migratory birds. These species include the American kestrel (Sparverius paulus), Bachman's sparrow (Aimophila aestivalis), cerulean warbler (Dendroica cerulean), common ground-dove (Columbina passerina exigua), lesser yellowlegs (Tringa favipes), prairie warbler (Dendroica discolor), prothonotary warbler (Protonotaria citrea), redheaded woodpecker (Melanerpes erythrocephalus), swallow-tailed kite (Elanoides forficatus), and wood thrush (Hylocichla mustelina). The environmental survey area is located within the Atlantic Migratory Flyway, broadly defined as the aggregate of species-specific avian migration routes that follow the Atlantic Coast in the United States and Canada (National Audubon Society, 2018). In late 2017, the Solicitor's office of the Department of the Interior issued Memorandum Opinion M-37050, which replaced M-37041. The general industry interpretation of M-037050 is that unintended impacts to bird species during normal construction activities does not constitute the definition of "take." Therefore, the need for preconstruction surveys for MBTA species nests may not be required. Coordination with USFWS will occur regarding the potential need for preconstruction surveys.

If nests or cavities with eggs or flightless young are observed during construction, construction crews will immediately stop work and contact the operations/construction lead, who will immediately notify GPC's Power Delivery Environmental Department. Additionally, if an osprey nest or eagle nest is observed during construction, construction crews will contact the operations/construction lead who will immediately contact GPC's Power Delivery Environmental Department.